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The President having directed the senior Secretary to read the Statutes for the election of Fellows, Sir Charles Lemon, Bart., and Mr. Wheatstone, were, with the consent of the meeting, appointed Scrutators. Mr. A. J. Stephens then moved that the meeting do now adjourn. The motion was seconded by Dr. John Lee, but on being put to the question was declared to be lost.

The election was then proceeded with, when the votes of the Fellows present having been collected, the following gentlemen were declared to have been duly elected:—

George Bishop, Esq.	John Henry Lefroy, Capt. R.A.
Rev. James Challis.	James Ormiston M ^c William, M.D.
Henry Clerk, Capt. R.E.	Thomas Oldham, Esq.
William Fergusson, Esq.	Lyon Playfair, Ph.D.
Robert Were Fox, Esq.	Robert Porrett, Esq.
Henry James, Capt. R.E.	John Stenhouse, Ph.D.
Robert Gordon Latham, M.D.	Allen Thomson, M.D.

The thanks of the Society were voted to the Scrutators, and the meeting adjourned.

November 16, 1848.

The MARQUIS OF NORTHAMPTON, President, in the Chair.

The time of the Meeting was occupied in reading the Minutes of the last Ordinary Meeting and of the General Meeting.

November 23, 1848.

GEORGE RENNIE, Esq., Treasurer, in the Chair.

“On the Chemical Nature of Wax.”—Part III. “On Myricine.” By B. C. Brodie, Esq. Communicated by Sir B. C. Brodie, Bart., F.R.S.

This paper is the last of three papers on the chemical nature of wax, and contains the investigation of that portion of bees-wax which is soluble only with difficulty in boiling alcohol. This body could never be rightly investigated before the discovery of the true nature of the other constituent of the wax, namely, the cerotic acid, for the absence of which no test was known, and the products of the decomposition of which would materially interfere with any experiments on the nature of the myricine. When the cerotic acid has been absolutely removed by repeated boiling of the wax with alcohol, a substance remains, which is saponifiable, but with difficulty. From the products of saponification the author isolated palmitic acid, $C_{32}H_{52}O_4$, and a new wax-alcohol, analogous to, but yet different from cerotine, described in a former paper. This alcohol, melissine, has the formula

$C_{60}H_{62}O_4$. By oxidation of this substance by means of lime and potash, the acid $C_{60}H_{60}O$, melissic acid, was obtained; and by the action of chlorine, a body analogous to chloral, a substance, that is, of the aldehyde series, but with a substitution of between fourteen and fifteen equivalents of chlorine for hydrogen. In its conversion into this substance the alcohol loses two equivalents of hydrogen, without substitution. The author also investigated the products of the distillation of myricine. From these he procured likewise palmitic acid and a solid hydrocarbon, which, rectified over potassium, had a melting-point of 62° , and contained, as shown by analysis, carbon and hydrogen in *equal* equivalents. The analogy of the mode of formation of this substance to cerotine from Chinese wax shows that it is the hydrocarbon, melene, $C_{60}H_{60}$. By repeated crystallization from ether a substance was obtained from the impure myricine, of a crystalline character, melting at 72° ; the analysis of which agrees with the formula $C_{92}H_{92}O_4$, which explains the reactions of the substance.

The general conclusion from this investigation is, that waxes are a class of bodies which, chemically speaking, stand in the same relation to fat as fatty bodies do to the alcohol and acetic acid of vinous fermentation; all which bodies are members of one chemical series, possess an analogous chemical character, and are susceptible of analogous transformations.

Robert Gordon Latham, M.D., was admitted into the Society.

"An account of Astronomical Observations proposed to be made in South America." By S. M. Gilliss, in an extract of a letter to Lieut.-Col. Sabine, R.A., For. Sec. R.S. Communicated by Lieut.-Col. Sabine.

DEAR SIR,

Washington, October 25, 1848.

During the month of April last I sent to you, through the Royal Society, a printed report from one of the naval committees in congress, recommending a grant of funds for the purpose of sending an astronomical expedition to the most available point in South America, to make observations which should have for their object the improvement or verification of the solar parallax. The basis of this report was a correspondence between Dr. Gerling of Marburg, other astronomers, and myself, that had been presented for consideration by the Secretary of the Navy, and, in accordance with the views of the Philosophical Society and of the Academy of Arts and Sciences, had been laid before congress for their decision.

Conformably with the recommendation of the committee, an appropriation was made, and the Honourable Secretary of the Navy directed to employ it in making the observations requested by the two societies just named. The command of the party has been assigned to me, and a plan of operations submitted to the societies having received their sanction, has been approved by the Secretary. This is briefly as follows:—

To embark the instruments and their assistants by the 1st of June